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CANCER OF THE WOMB

ITS SYMPTOMS, DIAGNOSIS, PROGNOSIS & TREATMENT

By

FREDERICK JOHN McCANN

M.D. (EDIN.), F.R.C.S. (ENG.), M.R.C.P. (LOND.)

PHYSICIAN TO IN-PATIENTS, SAMARITAN FREE HOSPITAL FOR WOMEN, LONDON; LECTURER ON GYNÆCOLOGY, MEDICAL GRADUATES' COLLEGE AND POLYCLINIC, LONDON; HONORARY PRESIDENT SECTION OF OBSTETRICS AND GYNÆCOLOGY, FIFTEENTH INTERNATIONAL MEDICAL CONGRESS, LISBON, 1906

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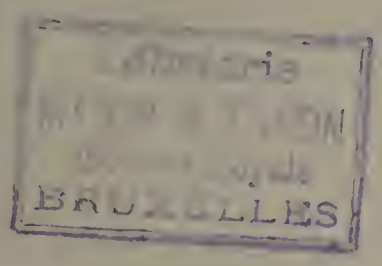

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CANCER OF THE WOMB

Early Recognition.

THIS book is written in order to assist the practitioner in the early recognition of Cancer of the Womb. For this purpose the Author has succeeded in collecting cases in which the disease has been found in its initial stages and photographs have been taken of the actual specimens removed. In addition, the different varieties of Cancer as it occurs in the Womb have been depicted and a short clinical history of each patient is given. The complete pictorial representation of every variety of Cancer as it occurs in the body and neck of the womb forms an important feature of the book. As the term "Cancer" is frequently employed to indicate every variety of malignant disease, an account is given of uterine sarcomata and chorion-epithelioma or deciduoma malignum, of which illustrative examples are described with photographic reproductions of the different types of sarcoma and chorion-epithelioma.

Pictorial Representation.

Clinical Aspects.

A concise account is given of the microscopical appearances of uterine Cancer, and the value of the microscope as an aid to diagnosis is fully discussed. It is, however, the clinical aspects of the disease which have received the fullest consideration, as it is by the appreciation of the clinical signs, especially the importance of hæmorrhage, that progress will be made towards earlier recognition of uterine Cancer. The importance of the microscope as an aid to diagnosis cannot be over-estimated, but it is most important to be able to estimate the value clinically of the early signs of this disease. A full description is given of the differential diagnosis and illustrative examples are quoted where necessary.

Surgical Treatment.

The surgical treatment is described in detail, and the relative advantages of the different operations are considered, together with statistics culled from various sources.

One chapter is devoted to a narration of cases operated on by the Author, a short clinical history being given together with a description of the disease removed, in order that the practitioner may more readily learn the clinical signs.

The last chapter has been devoted to the after-treatment of abdominal and vaginal operations undertaken for uterine Cancer, full details being given.

After Treatment.

As the after-treatment of operation cases is now so frequently left to the patient's own medical attendant, the Author has furnished a full account of the methods of treatment which he has found most efficacious in practice.

Inoperable Cancer.

Lastly, the treatment of *Inoperable* Cancer is described in detail.

THIS VOLUME IS THE FIRST OF A SERIES OF MONOGRAPHS WHICH WILL DEAL WITH MATTERS OF IMPORTANCE TO THE PROFESSION IN CONNEXION WITH THE DISEASES OF WOMEN. OF THESE A WORK ON "STERILITY" (BY THE SAME AUTHOR) AND TREATISES ON "PUERPERAL INFECTION" AND "PELVIC DISPLACEMENTS" ARE IN ACTIVE PREPARATION.

those who operate in a large percentage of cases, for it is quite possible for any gynæcological surgeon of experience to put together a list of favourable cases, and so mask the true value of operative treatment. To obtain a true idea of the value of surgical relief in this disease lists of consecutive operations extending over a series of years are required, which show, not only what particular operation is most beneficial, but also the benefits which have accrued from improvements in technique. Although such lists are available for estimating the value of vaginal hysterectomy, those published relating to abdominal hysterectomy are not yet sufficiently complete to determine either the value of the operation in preventing recurrence or the particular method of carrying out the operation so as to furnish the most uniformly successful results.

Before the abdominal operation becomes the method of choice for operating for cancer of the uterus the mortality must be not less than the vaginal method and the freedom from recurrence greater.

Signs and Symptoms of Recurrence after Operation.

The onset of hæmorrhage is a sign of grave import when the patient has undergone a previous radical operation for cancer. Indeed, where recurrence has been rapid a certain amount of bleeding, varying in its intensity, may have existed since the patient has been able to leave her bed. Whenever hæmorrhage occurs a local examination should at once be made. The presence of a discharge is also a sign of importance, and, although a certain amount of discharge and even slight hæmorrhage may be caused by a silk ligature or ligatures imbedded in the cicatrix, yet a local examination should also be made, for when the vaginal wounds heal well there is neither hæmorrhage nor discharge.

In addition to these local signs there are certain others which give rise to suspicion, and foremost among these is pain in one or both lower limbs or in the "hip bone," and this frequently indicates involvement of the cellular tissue. Superadded to this, the presence of œdema of the lower limb is not uncommon, together with venous thrombosis. Some patients exhibit somewhat rapid emaciation and cachexia, and in the absence of hæmorrhage or discharge this should suggest the possibility of a metastatic deposit, and for this reason a careful examination of the liver should be made. In other cases pain in the right hypochondriac region and jaundice point to hepatic disease.

Different views are held to explain the frequency of recurrence after operation, but the evidence is, I think, still in favour of the assumption that incomplete removal explains the majority of the cases. The proximity of the bladder, ureter, and rectum must always limit the extent of any operative procedure and, therefore, interfere with complete removal of all the disease in many cases. Lately inoculation of cancer-cells on the womb surface—the *Impfrezidive* of the German pathologists—is suggested by some as the principal cause of recurrence. Cases are reported where not only vaginal wounds, made to enlarge the field of operation, have been inoculated with cancer-cells, but also

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Ulcers caused by caustic may mislead, but the improvement after the caustic is discontinued and the history of its use will aid the judgment of the practitioner.

Decubitus Ulcers.—Bad-fitting pessaries, foreign bodies, etc., are causes of such ulceration. Similar ulcers form on the prolapsed womb and vaginal walls. They are mostly rounded, with raised edges, not infiltrated, not breaking down. The external os uteri is not affected. In some, granulation-tissue in little masses is noted on the surface and the edges. Epithelial islets may be present. There is rapid healing after removal of the irritant or the replacement of the prolapse.

Probably the majority of cancer cases which are overlooked are examples of disease affecting the lining of the cervical canal or the tissues of the wall of the cervix.

Cancer beginning in the cervical canal is not difficult to detect where the os uteri is dilated, as in many multiparæ. The finger may then be passed into the cervical canal, which is felt to be lined with irregular elevations or nodules, from which portions may be removed by the finger. Free hæmorrhage follows the examination.

Greater difficulty arises where the os uteri is not dilated and the disease is hidden. A sound passed into the cervical canal may give the impression of impinging on an irregular nodular surface. The hæmorrhage following such a manipulation causes suspicion. It may be necessary to dilate the external os in order that a more complete examination may be made.* The tissue lining the cervical canal is friable, and pieces may be removed by the curette.† *Per rectum*, thickening and hardening of the cervix is felt, in contra-distinction to the relatively small body of the uterus, and here let me add that you should never give an opinion on a case of cervical cancer without examining *per rectum*.

A Case simulating Cancer beginning in the Cervical Canal.

A spare, anæmic woman, æt. 51, complained of loss of blood after her period, lasting two weeks, and a very foul vaginal discharge, which had existed for fourteen days. She had had two children, the youngest being fifteen years of age, and one miscarriage at the third month, seven years after her last confinement.

Her menstrual periods were regular until a year ago, when the flow ceased for one month and recurred regularly. The menstrual period lasted six to seven days, profuse in amount, and was of the twenty-eight-day type. In December, 1904, the menses again ceased, but reappeared in the middle of January, 1905, lasting one week and being profuse in quantity. Her menstruation then ceased until the present trouble commenced (March, 1905). She had had no pain and had not lost flesh. Her uterus was slightly enlarged, movable, and firm in consistence. The os externum was patulous, and the finger introduced into the cervical canal detected some soft growth in the upper segment.

* In addition to metal dilators tents or gauze may be used.
† The curetted portions should be examined microscopically.

Should the polypus prove to be sarcomatous removal of the uterus is indicated. Dilatation will also aid in distinguishing interstitial or sub-peritoneal myomata, for the uterine cavity will be found free from malignant disease. Such distinction, however, is not of so much practical importance at the present time because if a myoma be causing injurious symptoms its removal is indicated. The occurrence of myoma and carcinoma in the same uterus is not rare (see p. 41).

Summary of the Early Signs and Symptoms of Cancer.

Irregular bleeding of any description, even if there only be traces; bleeding *post coitum*; watery blood-tinged discharge; in the early stages almost complete absence of pain.

As the majority of the cases occur between the fortieth and fiftieth year the symptoms are regarded by the patient as due to change of life. The medical attendant should guard against this assumption until he has proved that cancer does not exist.

Any bleeding, however slight, occurring after the menopause should give rise to the suspicion that cancer is present.

If a patient with any of the above symptoms comes for advice, a careful bimanual examination of the pelvic contents must be made before any treatment is recommended.

Should the patient refuse—and this is exceptional when the situation is properly explained to her—the medical attendant should decline any further responsibility in the case, and no treatment should be advised. An examination should be made, even if bleeding exists, as much valuable time may be lost by postponement until the hæmorrhage has ceased.

In the examination note carefully the condition of the vaginal portion of the cervix and of the cervix proper, remembering that three fourths of all uterine cancer takes its origin in these positions.

Remember that there are high-lying cervical cancers and cancers of the body of the uterus whose detection is only possible after curetting or digital exploration.

The microscope plays an important *rôle* in the diagnosis of early cases and in doubtful and suspicious cases.

If there be a suspicious hard nodule, or erosion, or ulcer on the external os uteri, a piece the size of a pea or bean with a boundary of healthy tissue should be excised.

If the vaginal portio be intact and there is uterine bleeding, sufficient material for examination may be obtained by using a curette or sharp spoon. The pieces should be sent to an expert for report.

If the report is favourable the patient will be reassured, if unfavourable immediate operation is imperative.

Early cancer can be cured by operation. About 10 per cent. of the cases are well five or more years after. This percentage would soon be increased if early diagnosis were more common.

The operation.—Vaginal hysterectomy has a mortality of only 5 per cent. The abdominal operation will soon be reduced to the same mortality. Never treat early cancerous ulcers with caustic: their

Specimen Illustration from
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PLATE VIII.

Early Ulceration of the Vaginal Portion of the Cervix.

The anterior wall of the cervix and uterus has been incised and the two halves pulled asunder. A shallow, punched-out ulcer is seen situated at the junction of the cervical mucosa with that covering the vaginal portion.

Specimen Illustration from
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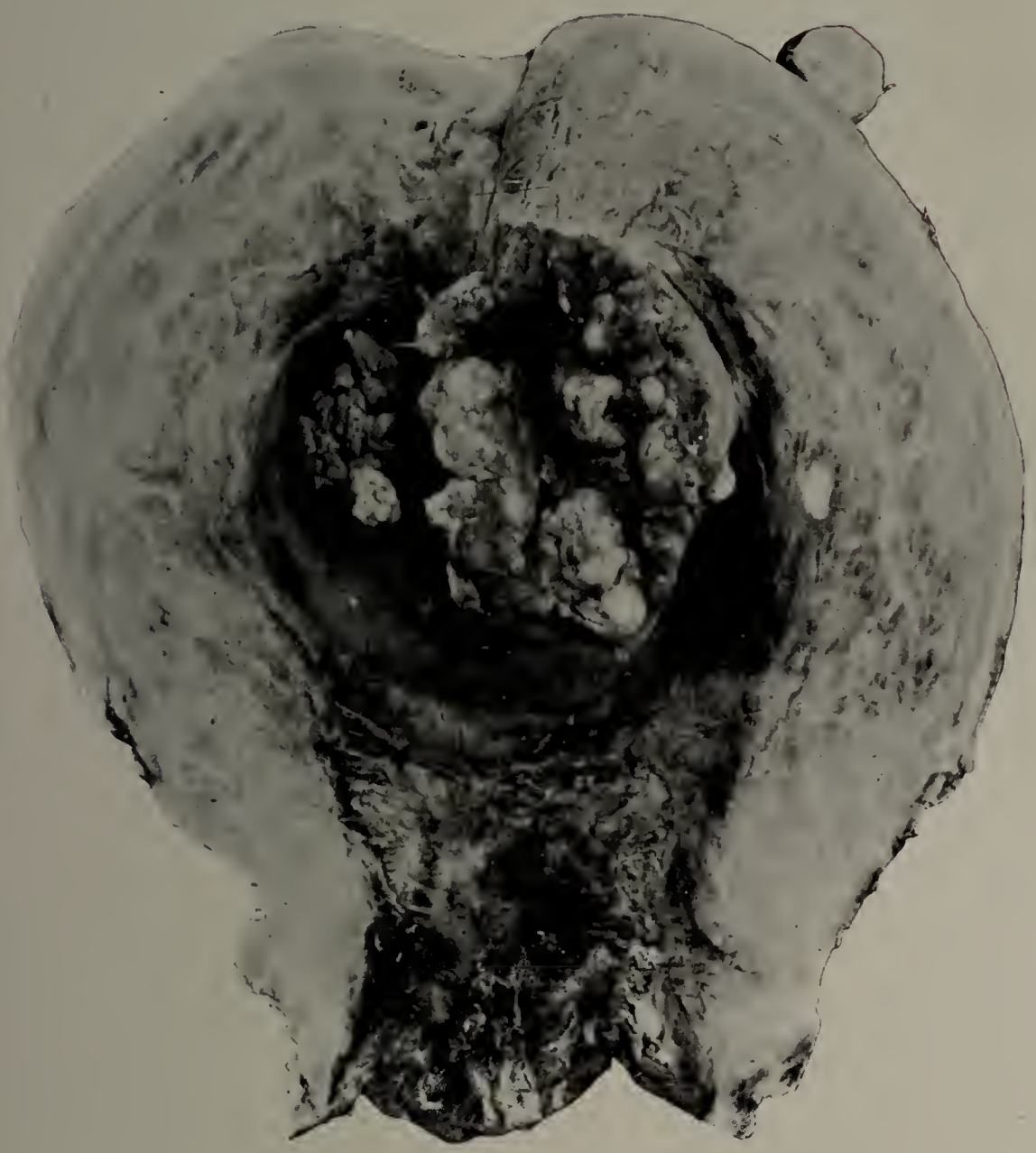
PLATE XX.

The Circumscribed or Papillomatous Variety of Cancer of the Body of the Uterus.



The specimen consists of the uterus, with a small fibroid on its peritoneal aspect, which was removed by abdominal hysterectomy from a patient æt. 59. She had had three children, and for eighteen months had suffered from a blood-tinged discharge, which had latterly become purulent, with slight offensive odour. She had not suffered any pain. Menstruation had ceased at the age of fifty. A small papillary growth is seen springing from the vicinity of the right tubal orifice, and a larger nodulated growth, commencing to necrose on the surface, is springing by a narrow base from the region of the left tubal orifice and hanging into the uterine cavity. The mucosa separating the two growths is not invaded, whilst that lining the remainder of the uterine body is unaffected. The cervix is also free from disease. The growth is an adeno-carcinoma.

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Where a preliminary scraping and cauterising* is employed any instruments used should be laid aside, so as to minimise the chances of epithelial or septic infection. The vagina and vulva are washed with ether soap and water and then swabbed with 1 in 2000 corrosive sublimate, and during this process care is taken to avoid making the cancer bleed. If the growth arises from the vaginal portio, it is necessary to grasp a portion of sound tissue, either cervix or vagina, with the vulsellum, in order that a firm hold may be obtained. By the aid of one or more vulsellæ the cervix is pulled downwards after a speculum has been introduced to retract the posterior vaginal wall.

A circular incision is now made with a knife around the cervix, at least 2 cm. from the margin of the new growth. This incision may have a lateral outward prolongation or be prolonged anteriorly. The lower limit of the bladder can be defined when the cervix is pushed backwards by the appearance of a transverse furrow, and if the incision be made in this position the bladder will not be injured. Similarly in the posterior vaginal wall when the cervix is pushed back there is a ring-like bulging of the posterior vaginal wall, and if it is incised in this position the pouch of Douglas will be opened at once. The appearance of the muscular fibres of the bladder will show where the vesical wall exists, and if the correct line of separation be reached there is usually no difficulty in separating the bladder from the anterior wall of the cervix. This is best done by the thumb or forefinger or a gauze sponge. Before using the finger all the tissue down to the bladder should be thoroughly divided with scissors. While separating the bladder it is important to continue the process laterally, so as to make sure that the portions of the bladder in relation to the broad ligaments are thoroughly loosened.

This manœuvre, which is best executed by the forefinger, insures the safety of the ureters. There may be some difficulty in detaching the bladder if the disease be advanced, and especially if it be the infiltrating type of cancer of the cervix proper. To overcome this difficulty it will be found useful to separate the bladder at the sides first, and then work in towards the middle of the cervix above the adherent portion. When this is accomplished the finger should be insinuated between the separated bladder and the cervix above the adhesion and the latter carefully divided on the finger with scissors. If a portion of the vesical muscular wall be removed, the bladder should be sutured with catgut.

The posterior vaginal wall is now separated, but if divided in the proper position very little separation is required. It is well to avoid too much separation, as it opens up fresh channels for infection, epithelial and septic.

When the peritoneum is exposed it is caught with forceps and incised with scissors. The opening is enlarged and the edge of the peritoneum united by three or four catgut sutures to the cut margin of the posterior vaginal wall. The bladder being freely separated, the

* I frequently omit this preliminary preparation of the growth, for I believe it is not free from danger, as it may favour the spread of septic infection as well as tend to disseminate the cancer. As may be seen from the plates, the growths have been removed without any previous scraping.

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The object of this treatment is to burn out those portions of the growth which are not reached by the sharp spoon and to arrest thoroughly all hæmorrhage. It may be necessary, in order to prevent burning of the vaginal walls, to remove the specula or retractors and place them in cold lotion.

After the application of the cautery the crater-like cavity should be tightly plugged with iodoform gauze, or previous to the plugging should be filled with a powder composed of equal parts of boric acid and tannic acid.

The danger attending this treatment is small if the precautions already mentioned are taken, but it should only be undertaken by those practised in vaginal surgery. Even although the peritoneum is opened, no harm has followed in my own cases. There is obvious danger in applying the cautery to the interior of the uterus where cancer affects the body, and it is well to ascertain by means of the finger what is the thickness of the uterine wall at various levels, in order to guard against the risk of penetrating through the wall into the peritoneal cavity.

It is noteworthy that after this operation there is frequently considerable diminution in the pain from which the patient has suffered. The gauze should be removed in three to four days, and, if necessary, re-introduced in order to keep the surface dry. No douching is employed, the slough being permitted to separate gradually whilst the patient is kept in bed. When the separation has occurred, and there is no other contra-indication, she may be permitted to leave her bed.

A variety of medicaments have been employed to diminish the size of the cavity, and, if possible, to produce cicatrisation.

Strong tincture of iodine (iodi pura, 1 part; sp. rectificat., 8 parts) may be used to swab out the cavity, which is afterwards packed with iodoform gauze. This method of treatment is not painful, and may be carried out in the consulting-room. It should be repeated every two or three days until the cavity is thoroughly cleaned and diminished in size, and, in certain cases, only a slightly blood-tinged, watery discharge remains, which has lost all odour. This method is of special utility in cancer commencing in the interior of the cervix, and produces a good effect through the action of the alcohol as well as the iodine.

The plan which is now so frequently adopted is the employment of chloride of zinc, which was popularised by Marion Sims.* Sims operated as follows: After curetting the cancer, the bleeding was stilled by "perchloride of iron wool," and then tampons of wool soaked in a watery solution of chloride of zinc (2—3) were packed into the cavity and left for four or five days. In order to protect the vagina from the caustic, wool tampons soaked in bicarbonate of soda were employed. Bicarbonate of soda ointment (sodi bicarb., 1; vaselin, 4) may also be used.

Many modifications have been suggested, but it is necessary to vary the technique according to the circumstances of each case; for if the disease is close to the bladder, rectum, or peritoneum of Douglas' pouch, it is not wise to leave the caustic *in situ* too long, as there is no

* 'Amer. Journ. of Obstet.,' vol. xii.

Clinical History.

Deciduoma may occur at any age during the child-bearing period, and has been observed by me* in a woman after the menopause (see Case 1). As already mentioned, it may occur after labour at term, abortion, or hydatidiform mole. Fifty per cent. of the cases have been observed to follow a hydatid mole; hence it is necessary on the occurrence of hæmorrhage following this condition, or any obscure symptoms, to examine the interior of the uterus and any scrapings which may be removed by the curette.

In more than one half of the cases the first indication is the appearance of vaginal or vulval metastases, usually not noted until some weeks or months after the puerperium. But the repeated and profuse uterine bleeding should give rise to suspicion, and when the uterus is explored and curetted the presence of the characteristic tissue on microscopic examination settles the diagnosis. Profound anæmia is exhibited by the patient, and in the late stages cachexia. The discharge becomes fœtid and watery, and the patients exhibit signs of septic absorption accompanied by rigors and elevation of temperature. Cough, dyspnœa, and expectoration of blood point to the presence of pulmonary metastases, although these signs may be entirely absent.

Case 1.—A sallow-complexioned woman, æt. 53, was sent to me by Dr. Batson, of Dorking. She was admitted into the Samaritan Hospital on March 21st, 1902. She had had ten children. Her last pregnancy, nine years previously, terminated at the third month. Eighteen months before her admission into the hospital her menstrual periods ceased, and no blood loss was noticed until October, 1901, when a sudden gush of blood came from the vagina, followed by continuance of the flow for one day. This free hæmorrhage recurred every four or five days until three weeks before admission, when only a brown discharge was noticed. The severity of the hæmorrhage necessitated her confinement to bed during its progress. She had no pelvic pain, but had been losing flesh.

Bimanual examination.—The uterus was found to be enlarged to about the size of a three months' pregnancy. The enlargement was uniform and soft in consistence. The uterus was freely movable. A small fleshy polyp was growing from the external os uteri. Slight uterine hæmorrhage followed the examination.

The uterine cavity was explored under anæsthesia on March 24th, 1902. When I passed a uterine sound into the cavity blood literally poured out of the uterus. An iodoform gauze plug was employed to arrest the bleeding, and as I had not obtained the consent of the patient for hysterectomy she was returned to bed.

I have never seen the non-gravid uterus bleed so freely as it did in this patient. She had informed me that at home the hæmorrhage was most alarming and very difficult to control.'

Two days later, with her consent, I performed vaginal hysterectomy. The uterus was plentifully supplied with blood-vessels, and on removal

* McCann, 'Journ. of Obstet. and Gyn. of the British Empire,' March, 1903.

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